

# PCT

## INTERNATIONAL SEARCH REPORT

(PCT Article 18 and Rules 43 and 44)

Applicant's or agent's file reference <b>N. 77197A</b>	<b>FOR FURTHER ACTION</b> see Notification of Transmittal of International Search Report (Form PCT/ISA/220) as well as, where applicable, item 5 below.	
International application No. <b>PCT/GB 00/ 02571</b>	International filing date (day/month/year) <b>05/07/2000</b>	(Earliest) Priority Date (day/month/year) <b>08/07/1999</b>
Applicant <b>ISIS INNOVATION LIMITED et al.</b>		

This International Search Report has been prepared by this International Searching Authority and is transmitted to the applicant according to Article 18. A copy is being transmitted to the International Bureau.

This International Search Report consists of a total of 4 sheets.  
☒ It is also accompanied by a copy of each prior art document cited in this report.

### 1. Basis of the report

a. With regard to the **language**, the international search was carried out on the basis of the international application in the language in which it was filed, unless otherwise indicated under this item.

☐ the international search was carried out on the basis of a translation of the international application furnished to this Authority (Rule 23.1(b)).

b. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, the international search was carried out on the basis of the sequence listing :

☐ contained in the international application in written form.

☐ filed together with the international application in computer readable form.

☐ furnished subsequently to this Authority in written form.

☐ furnished subsequently to this Authority in computer readable form.

☐ the statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.

☐ the statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished

2. ☐ **Certain claims were found unsearchable** (See Box I).

3. ☐ **Unity of invention is lacking** (see Box II).

4. With regard to the **title**,

☒ the text is approved as submitted by the applicant.

☐ the text has been established by this Authority to read as follows:

5. With regard to the **abstract**,

☐ the text is approved as submitted by the applicant.

☒ the text has been established, according to Rule 38.2(b), by this Authority as it appears in Box III. The applicant may, within one month from the date of mailing of this international search report, submit comments to this Authority.

6. The figure of the **drawings** to be published with the abstract is Figure No.

☒ as suggested by the applicant.

☐ because the applicant failed to suggest a figure.

☐ because this figure better characterizes the invention.

2  
☐ None of the figures.

# INTERNATIONAL SEARCH REPORT

International application No.

PCT/GB 00/ 02571

## Box III TEXT OF THE ABSTRACT (Continuation of item 5 of the first sheet)

The abstract is changed as follows:

A mask for producing a printed circuit board is defined in which the conductor elements of the printed circuit pattern are delineated by a constant width etch band(20). This means that all conductors(3a,3b,9)are separated from neighbouring areas of conductive material(22) by the same distance. Thus etch rates across the printed circuit pattern do not vary according to the separation of the conductors(3a,3b,9).

# INTERNATIONAL SEARCH REPORT

International Application No

PCT/GB 00/02571

**A. CLASSIFICATION OF SUBJECT MATTER**  
IPC 7 H05K3/06

According to International Patent Classification (IPC) or to both national classification and IPC

**B. FIELDS SEARCHED**

Minimum documentation searched (classification system followed by classification symbols)  
IPC 7 H05K

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, PAJ, WPI Data, INSPEC

**C. DOCUMENTS CONSIDERED TO BE RELEVANT**

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	DE 19 36 775 A (LICENTIA GMBH) 25 March 1971 (1971-03-25)  the whole document ---	1-3, 7-10, 14, 17-19
X	GB 784 673 A (STANDARD TELEPHONES AND CABLES)  page 2, line 31 - line 56; figure 3 ---	1, 2, 7, 8, 10, 14, 17-19
X	DE 41 31 065 A (SIEMENS AG) 4 March 1993 (1993-03-04) column 3, line 39 - column 4, line 16; figures 5-7 --- -/--	8-10, 14, 17, 18

☒ Further documents are listed in the continuation of box C.

☒ Patent family members are listed in annex.

\* Special categories of cited documents :

- \*A\* document defining the general state of the art which is not considered to be of particular relevance
- \*E\* earlier document but published on or after the international filing date
- \*L\* document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)
- \*O\* document referring to an oral disclosure, use, exhibition or other means
- \*P\* document published prior to the international filing date but later than the priority date claimed

\*T\* later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention

\*X\* document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone

\*Y\* document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.

\* & \* document member of the same patent family

Date of the actual completion of the international search

23 January 2001

Date of mailing of the international search report

29/01/2001

Name and mailing address of the ISA

European Patent Office, P.B. 5818 Patentlaan 2  
NL - 2280 HV Rijswijk  
Tel. (+31-70) 340-2040, Tx. 31 651 epo nl,  
Fax: (+31-70) 340-3016

Authorized officer

Mes, L

C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category °	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	<p>"SUBTRACTIVE ETCH PROMOTING DUMMY LINES"            IBM TECHNICAL DISCLOSURE BULLETIN,US,IBM            CORP. NEW YORK,            vol. 32, no. 3B,            1 August 1989 (1989-08-01), page 323            XP000029839            ISSN: 0018-8689            the whole document</p>	1,3,7-9, 14,18,19
A	<p>Y. TANAKA ET AL.: "Three Micron Meter            Copper Foil Clad Laminate for 30/30 Micron            Meter Line/space Circuit"            CIRCUITREE,            vol. 10, no. 11, November 1997 (1997-11),            page 40,42,44,48 XP000978483            CIRCUITREE PUB., SANTA CLARA, CA,, US            ISSN: 1059-843X            the whole document</p>	4-6, 11-13
A	<p>"LASER SCRIBED LABYRINTH TYPE CIRCUIT FOR            CIRCUIT BOARD"            IBM TECHNICAL DISCLOSURE BULLETIN,IBM            CORP. NEW YORK,US,            vol. 32, no. 6B,            1 November 1989 (1989-11-01), pages            359-361, XP000073766            ISSN: 0018-8689            the whole document</p>	8-10,14, 17,18
A	<p>US 5 790 383 A (INAGAWA )            4 August 1998 (1998-08-04)            column 2, line 35 - line 49; figure 2</p>	8,9,18

**INTERNATIONAL SEARCH REPORT**

Information on patent family members

International Application No

PCT/GB 00/02571

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
DE 1936775 A	25-03-1971	NONE	
GB 784673 A		NONE	
DE 4131065 A	04-03-1993	NONE	
US 5790383 A	04-08-1998	JP 9232697 A	05-09-1997

## PATENT COOPERATION TREATY

PCT

## NOTIFICATION OF ELECTION

(PCT Rule 61.2)

From the INTERNATIONAL BUREAU

To:

Commissioner  
 US Department of Commerce  
 United States Patent and Trademark  
 Office, PCT  
 2011 South Clark Place Room  
 CP2/5C24  
 Arlington, VA 22202  
 ETATS-UNIS D'AMERIQUE  
 in its capacity as elected Office

<b>Date of mailing</b> (day/month/year) 13 March 2001 (13.03.01)	
<b>International application No.</b> PCT/GB00/02571	<b>Applicant's or agent's file reference</b> N.77197A
<b>International filing date</b> (day/month/year) 05 July 2000 (05.07.00)	<b>Priority date</b> (day/month/year) 08 July 1999 (08.07.99)
<b>Applicant</b> BAND, Cyril, William	

1. The designated Office is hereby notified of its election made:

☒ in the demand filed with the International Preliminary Examining Authority on:  
 25 January 2001 (25.01.01)

☐ in a notice effecting later election filed with the International Bureau on:  
 \_\_\_\_\_

2. The election ☒ was  
☐ was not

made before the expiration of 19 months from the priority date or, where Rule 32 applies, within the time limit under Rule 32.2(b).

<b>The International Bureau of WIPO</b> 34, chemin des Colombettes 1211 Geneva 20, Switzerland Facsimile No.: (41-22) 740.14.35	Authorized officer Pascal Piriou Telephone No.: (41-22) 338.83.38
--	---

REC'D 11 SEP 2001


WIPO

PCT

## PCT

## INTERNATIONAL PRELIMINARY EXAMINATION REPORT

(PCT Article 36 and Rule 70)

Applicant's or agent's file reference N.77197A MN		<b>FOR FURTHER ACTION</b> See Notification of Transmittal of International Preliminary Examination Report (Form PCT/IPEA/416)	
International application No. PCT/GB00/02571	International filing date (day/month/year) 05/07/2000	Priority date (day/month/year) 08/07/1999	
International Patent Classification (IPC) or national classification and IPC H05K1/00			
Applicant ISIS INNOVATION LIMITED et al.			
<p>1. This international preliminary examination report has been prepared by this International Preliminary Examining Authority and is transmitted to the applicant according to Article 36.</p> <p>2. This REPORT consists of a total of 6 sheets, including this cover sheet.</p> <p><input type="checkbox"/> This report is also accompanied by ANNEXES, i.e. sheets of the description, claims and/or drawings which have been amended and are the basis for this report and/or sheets containing rectifications made before this Authority (see Rule 70.16 and Section 607 of the Administrative Instructions under the PCT).</p> <p>These annexes consist of a total of sheets.</p>			
<p>3. This report contains indications relating to the following items:</p> <ul style="list-style-type: none"> <li>I <input checked="" type="checkbox"/> Basis of the report</li> <li>II <input type="checkbox"/> Priority</li> <li>III <input type="checkbox"/> Non-establishment of opinion with regard to novelty, inventive step and industrial applicability</li> <li>IV <input type="checkbox"/> Lack of unity of invention</li> <li>V <input checked="" type="checkbox"/> Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement</li> <li>VI <input type="checkbox"/> Certain documents cited</li> <li>VII <input checked="" type="checkbox"/> Certain defects in the international application</li> <li>VIII <input checked="" type="checkbox"/> Certain observations on the international application</li> </ul>			
Date of submission of the demand  25/01/2001		Date of completion of this report  07.09.2001	
Name and mailing address of the international preliminary examining authority:  European Patent Office D-80298 Munich Tel. +49 89 2399 - 0 Tx: 523656 epmu d Fax: +49 89 2399 - 4465		Authorized officer  Batev, P  Telephone No. +49 89 2399 7970	



**INTERNATIONAL PRELIMINARY  
EXAMINATION REPORT**

International application No. PCT/GB00/02571

**I. Basis of the report**

1. With regard to the **elements** of the international application (*Replacement sheets which have been furnished to the receiving Office in response to an invitation under Article 14 are referred to in this report as "originally filed" and are not annexed to this report since they do not contain amendments (Rules 70.16 and 70.17)*):  
**Description, pages:**

1-5 as originally filed

**Claims, No.:**

1-19 as originally filed

**Drawings, sheets:**

1/2-2/2 as originally filed

2. With regard to the **language**, all the elements marked above were available or furnished to this Authority in the language in which the international application was filed, unless otherwise indicated under this item.

These elements were available or furnished to this Authority in the following language: , which is:

- ☐ the language of a translation furnished for the purposes of the international search (under Rule 23.1(b)).
- ☐ the language of publication of the international application (under Rule 48.3(b)).
- ☐ the language of a translation furnished for the purposes of international preliminary examination (under Rule 55.2 and/or 55.3).

3. With regard to any **nucleotide and/or amino acid sequence** disclosed in the international application, the international preliminary examination was carried out on the basis of the sequence listing:

- ☐ contained in the international application in written form.
- ☐ filed together with the international application in computer readable form.
- ☐ furnished subsequently to this Authority in written form.
- ☐ furnished subsequently to this Authority in computer readable form.
- ☐ The statement that the subsequently furnished written sequence listing does not go beyond the disclosure in the international application as filed has been furnished.
- ☐ The statement that the information recorded in computer readable form is identical to the written sequence listing has been furnished.

4. The amendments have resulted in the cancellation of:

- ☐ the description, pages:
- ☐ the claims, Nos.:



# INTERNATIONAL PRELIMINARY EXAMINATION REPORT

International application No. PCT/GB00/02571

☐ the drawings, sheets:

5. ☐ This report has been established as if (some of) the amendments had not been made, since they have been considered to go beyond the disclosure as filed (Rule 70.2(c)):

*(Any replacement sheet containing such amendments must be referred to under item 1 and annexed to this report.)*

6. Additional observations, if necessary:

## V. Reasoned statement under Article 35(2) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement

### 1. Statement

Novelty (N)	Yes:	Claims	4 - 7, 11 - 13, 18, 19
	No:	Claims	1 - 3, 8 - 10, 14, 17
Inventive step (IS)	Yes:	Claims	none
	No:	Claims	1 - 19
Industrial applicability (IA)	Yes:	Claims	1 - 19
	No:	Claims	none

2. Citations and explanations  
**see separate sheet**

## VII. Certain defects in the international application

The following defects in the form or contents of the international application have been noted:  
**see separate sheet**

## VIII. Certain observations on the international application

The following observations on the clarity of the claims, description, and drawings or on the question whether the claims are fully supported by the description, are made:  
**see separate sheet**

**Re Item V**

**Reasoned statement under Rule 66.2(a)(ii) with regard to novelty, inventive step or industrial applicability; citations and explanations supporting such statement**

Reference is made to the following document:

D1: DE 19 36 775 A (LICENTIA GMBH) 25 March 1971 (1971-03-25)

Insofar as the examiner can understand the claims, the following is pointed out:

1. Document D1, which is considered to represent the most relevant state of the art, discloses (p. 5, l. 1 - p. 6, l. 7; Fig. 1 - 4) a method of producing a mask for use in producing a resist pattern for etching of a printed circuit. According to the disclosed method a constant width etch band delineating the desired printed circuit conductor pattern is defined in the mask (Fig. 4).

The subject matter of independent claim 1 is, therefore, not new (Article 33(2) PCT).

2. Document D1 discloses an etch band that corresponds to the narrowest separation between conductors in the printed circuit. Consequently, the etch band is of the same width as the narrowest separation. The etch band is also of the same width as the narrowest conductor (i.e. 0.5 mm, see p. 5, l. 13 - 16).

The etch band known from D1 separates the desired printed circuit conductor pattern from regions of unused conductor on the printed circuit (Fig. 4).

The subject matter of claims 2 and 3 lacks, therefore, novelty (Article 33(2) PCT).

3. Dependent claims 4 - 6 do not define further method steps but only technical features of the conductor pattern. However, these technical features are merely available design options that the skilled person would select in accordance with circumstances.

The subject matter of claims 4 - 6 cannot, therefore, be seen as involving an inventive step (Article 33(3) PCT).

4. Document D1 discloses (Fig. 5) a printed circuit in which the printed circuit elements are delineated by a constant width etch band.

The etch band separates the printed circuit elements from regions of unused conductor. The etch band is of the same width as the narrowest conductor and the narrowest separation between conductors in the printed circuit (the etch band is itself the

narrowest separation).

The subject matter of independent claim 8 and dependent claims 9 and 10 is, therefore, not new (Article 33(2) PCT).

5. The additional technical features of claims 11 - 13 are merely available design options that the skilled person would select in accordance with circumstances.

The subject matter of dependent claims 11 - 13 lacks, therefore, an inventive step (Article 33(3) PCT).

6. Document D1 discloses (p. 7, l. 16 - p. 8, l. 5) a method of producing a printed circuit comprising a pattern of conductor elements. The method comprises the step of defining on a printed circuit substrate a pattern of resist to leave exposed regions of conductor to be etched away. The exposed regions comprises areas of constant width delineating the conductor elements.

The subject matter of independent claim 14 is, therefore, not new (Article 33(2) PCT).

7. Dependent claims 15 and 16 do not define further method steps but only technical features of the conductor pattern. However, the subject matter of said claims cannot be seen as involving an inventive step for the reasons stated in §3 and 5 herein above (Article 33(3) PCT).

8. The additional feature of claim 17 is known from D1 (see §2 herein above). The subject matter of dependent claim 17 lacks, therefore, novelty (Article 33(2) PCT).

## **Re Item VII**

### **Certain defects in the international application**

1. Independent claim 7 does not specify any technical features of a mask but seeks to define the subject matter by the use of the mask and the method for its production. The requirements of Rule 6.3(a) PCT are, therefore, not met (see also the Guidelines, Chapter III-4.4).

2. Independent claims 18 and 19, contrary to the requirements of Rule 6.2(a) and Rule 6.3(a) PCT, attempt to define the subject matter only by reference to the drawings and the

description (see also the Guidelines, Chapter III-4.10).

3. The features of the device claims should be provided with reference signs placed in parentheses in order to facilitate their understanding (Rule 6.2(b) PCT).

4. Contrary to the requirements of Rule 5.1(a)(ii) PCT, the relevant background art disclosed in the document D1 is not mentioned in the description, nor is this document identified therein.

**Re Item VIII**

**Certain observations on the international application**

1. The term "substantially" used in claims 2, 10 and 17 has no well-recognised meaning and renders the definition of the subject-matter unclear. It should be replaced by a more precise wording or deleted (Guidelines, Chapter III-4.5).

2. The word "about" used in claims 4 -6, 11 - 13, 15 and 16 should be avoided when defining values as it renders the definition of the subject matter unclear (Guidelines, Chapter III-4.5a).

\*\*\*\*\*

(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization  
International Bureau



(43) International Publication Date  
18 January 2001 (18.01.2001)

PCT

(10) International Publication Number  
**WO 01/05200 A2**

(51) International Patent Classification<sup>7</sup>: **H05K 1/00**

[GB/GB]; The Paddock, 83 High Street, Finstock, Chipping Norton, Oxon OX7 3DA (GB).

(21) International Application Number: PCT/GB00/02571

(22) International Filing Date: 5 July 2000 (05.07.2000)

(74) Agents: NICHOLLS, Michael, John et al.; J.A. Kemp & Co., 14 South Square, Gray's Inn, London WC1R 5LX (GB).

(25) Filing Language: English

(81) Designated States (*national*): JP, US.

(26) Publication Language: English

(84) Designated States (*regional*): European patent (AT, BE, CH, CY, DE, DK, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE).

(30) Priority Data:  
9916060.8 8 July 1999 (08.07.1999) GB

(71) Applicant (*for all designated States except US*): ISIS INNOVATION LIMITED [GB/GB]; Ewert House, Ewert Place, Summertown, Oxford OX2 7BZ (GB).

**Published:**

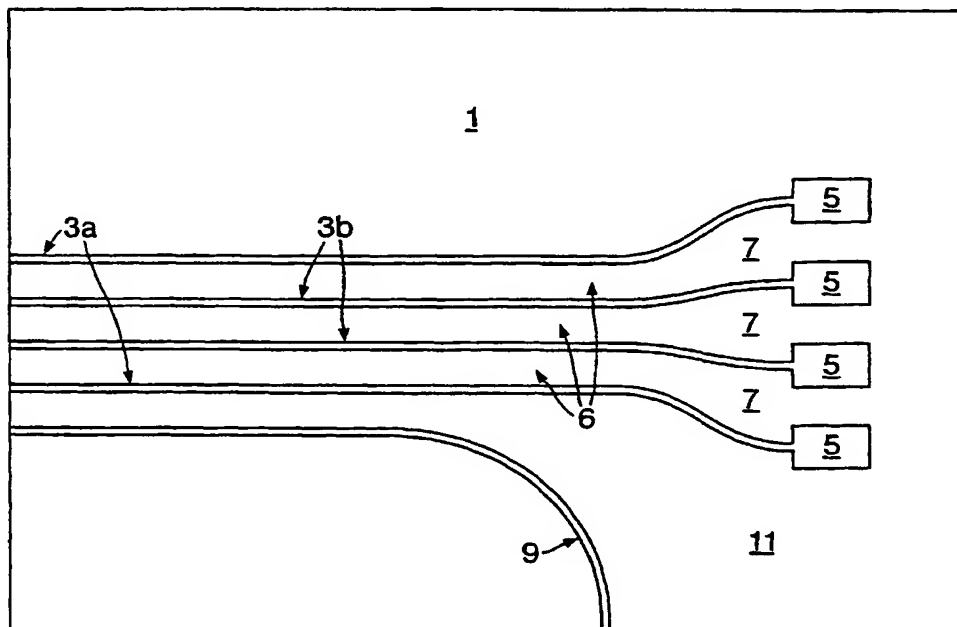
— Without international search report and to be republished upon receipt of that report.

*For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.*

(72) Inventor; and

(75) Inventor/Applicant (*for US only*): BAND, Cyril, William

(54) Title: PRINTED CIRCUIT FABRICATION



(57) Abstract: A mask for producing a printed circuit board is defined in which the conductor elements of the printed circuit pattern are delineated by a constant width etch band. This means that all conductors are separated from neighbouring areas of conductive material by the same distance. Thus etch rates across the printed circuit pattern do not vary according to the separation of the conductors.



WO 01/05200 A2

# INTERNATIONAL SEARCH REPORT

Interr. 1st Application No  
PCT/GB 00/02571

**A. CLASSIFICATION OF SUBJECT MATTER**  
IPC 7 H05K3/06

According to International Patent Classification (IPC) or to both national classification and IPC

**B. FIELDS SEARCHED**

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 H05K

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, PAJ, WPI Data, INSPEC

**C. DOCUMENTS CONSIDERED TO BE RELEVANT**

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	DE 19 36 775 A (LICENTIA GMBH) 25 March 1971 (1971-03-25)  the whole document ---	1-3, 7-10,14, 17-19
X	GB 784 673 A (STANDARD TELEPHONES AND CABLES)  page 2, line 31 - line 56; figure 3 ---	1,2,7,8, 10,14, 17-19
X	DE 41 31 065 A (SIEMENS AG) 4 March 1993 (1993-03-04) column 3, line 39 -column 4, line 16; figures 5-7 --- -/--	8-10,14, 17,18

☒ Further documents are listed in the continuation of box C.

☒ Patent family members are listed in annex.

\* Special categories of cited documents :

- \*A\* document defining the general state of the art which is not considered to be of particular relevance
- \*E\* earlier document but published on or after the international filing date
- \*L\* document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)
- \*O\* document referring to an oral disclosure, use, exhibition or other means
- \*P\* document published prior to the international filing date but later than the priority date claimed

- \*T\* later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
- \*X\* document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
- \*Y\* document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.
- \*G\* document member of the same patent family

Date of the actual completion of the international search

23 January 2001

Date of mailing of the international search report

29/01/2001

Name and mailing address of the ISA

European Patent Office, P.B. 5818 Patentlaan 2  
NL - 2280 HV Rijswijk  
Tel (+31-70) 340-2040, Tx. 31 651 epo nl,  
Fax: (+31-70) 340-3016

Authorized officer

Mes, L

# INTERNATIONAL SEARCH REPORT

Information on patent family members

International Application No

PCT/GB 00/02571

Patent document cited in search report	Publication date	Patent family member(s)	Publication date
DE 1936775 A	25-03-1971	NONE	
GB 784673 A		NONE	
DE 4131065 A	04-03-1993	NONE	
US 5790383 A	04-08-1998	JP 9232697 A	05-09-1997

## INTERNATIONAL SEARCH REPORT

International Application No

PCT/GB 00/02571

## A. CLASSIFICATION OF SUBJECT MATTER

IPC 7 H05K3/06

According to International Patent Classification (IPC) or to both national classification and IPC

## B. FIELDS SEARCHED

Minimum documentation searched (classification system followed by classification symbols)

IPC 7 H05K

Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched

Electronic data base consulted during the international search (name of data base and, where practical, search terms used)

EPO-Internal, PAJ, WPI Data, INSPEC

## C. DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
X	DE 19 36 775 A (LICENTIA GMBH) 25 March 1971 (1971-03-25)  the whole document ---	1-3, 7-10, 14, 17-19
X	GB 784 673 A (STANDARD TELEPHONES AND CABLES)  page 2, line 31 - line 56; figure 3 ---	1, 2, 7, 8, 10, 14, 17-19
X	DE 41 31 065 A (SIEMENS AG) 4 March 1993 (1993-03-04) column 3, line 39 - column 4, line 16; figures 5-7 --- -/--	8-10, 14, 17, 18



Further documents are listed in the continuation of box C.



Patent family members are listed in annex.

## \* Special categories of cited documents:

- \*A\* document defining the general state of the art which is not considered to be of particular relevance
- \*E\* earlier document but published on or after the international filing date
- \*L\* document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified)
- \*O\* document referring to an oral disclosure, use, exhibition or other means
- \*P\* document published prior to the international filing date but later than the priority date claimed

- \*T\* later document published after the international filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention
- \*X\* document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone
- \*Y\* document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art.
- \*Z\* document member of the same patent family

Date of the actual completion of the international search

23 January 2001

Date of mailing of the international search report

29/01/2001

Name and mailing address of the ISA

European Patent Office, P.B. 5818 Patentlaan 2  
NL - 2280 HV Rijswijk  
Tel. (+31-70) 340-2040, Tx. 31 651 epo nl,  
Fax (+31-70) 340-3016

Authorized officer

Mes, L



## INTERNATIONAL SEARCH REPORT

1st Application No

PCT/GB 00/02571

## C.(Continuation) DOCUMENTS CONSIDERED TO BE RELEVANT

Category *	Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.
A	"SUBTRACTIVE ETCH PROMOTING DUMMY LINES" IBM TECHNICAL DISCLOSURE BULLETIN, US, IBM CORP. NEW YORK, vol. 32, no. 3B, 1 August 1989 (1989-08-01), page 323 XP000029839 ISSN: 0018-8689 the whole document	1,3,7-9, 14,18,19
A	Y. TANAKA ET AL.: "Three Micron Meter Copper Foil Clad Laminate for 30/30 Micron Meter Line/space Circuit" CIRCUITREE, vol. 10, no. 11, November 1997 (1997-11), page 40,42,44,48 XP000978483 CIRCUITREE PUB., SANTA CLARA, CA., US ISSN: 1059-843X the whole document	4-6, 11-13
A	"LASER SCRIBED LABYRINTH TYPE CIRCUIT FOR CIRCUIT BOARD" IBM TECHNICAL DISCLOSURE BULLETIN, IBM CORP. NEW YORK, US, vol. 32, no. 6B, 1 November 1989 (1989-11-01), pages 359-361, XP000073766 ISSN: 0018-8689 the whole document	8-10,14, 17,18
A	US 5 790 383 A (INAGAWA ) 4 August 1998 (1998-08-04) column 2, line 35 - line 49; figure 2	8,9,18

**INTERNATIONAL SEARCH REPORT**

Information on patent family members

International Application No

PCT/GB 00/02571

Patent document cited in search report		Publication date	Patent family member(s)	Publication date
DE 1936775	A	25-03-1971	NONE	
GB 784673	A		NONE	
DE 4131065	A	04-03-1993	NONE	
US 5790383	A	04-08-1998	JP 9232697 A	05-09-1997